MERCHANDISE RETURN SYSTEM

WITH VALUE ADDED RETURNS PROCESSING

(DATA COMMUNICATIONS)

RELATED PATENT APPLICATION

This application claims the benefit of U.S. Provisional Application Serial No. 60/446,142 filed February 10, 2003 and entitled "Retail Package Returns Service System Using Postage Due Labels".

TECHNICAL FIELD OF THE INVENTION

This invention relates to merchandise return methods and systems, and more particularly to a method of managing returns of goods purchased from retailers and other merchants.

BACKGROUND OF THE INVENTION

The typical returns process for most direct retailers, includes providing a static return label on the order summary where the customer pays out-of-pocket and finds a shipper to start the return process. Customers who uses this type of return system have been shown to have lower satisfaction with the returns process than other key customer service areas. The process suffers from lack of visibility because the merchant does not receive advance notification of in-transit returns. As a result, customer service and warehouse receiving does not have visibility into the flow of returns track packages or deliver early customer notifications. The process further suffers from inefficient transportation load-balancing. Shipments are not load-balanced by warehouse by the carrier, forcing additional intra-warehouse transportation and processing.

The growing use of electronic commerce as a customer marketplace has led to a greater need for appropriate customer return methods. In the absence of conveniently located retail stores, the customer needs an acceptable method of returning goods. Various "reverse logistics" systems have been developed to meet this need. These systems are a subset of the growing industry of "supply chain management" systems, and are designed to help merchants manage customer returns.

For returns, as opposed to forward deliveries, the typical returns process requires the customer to take the package to the carrier and pay shipping costs. As an alternative to customer-paid shipping, some merchants have turned to a merchandise return service available from the United States Postal Service (USPS), which

permits the customer use an addressed and prepaid merchandise return label. The customer may deposit the package at any post office or in a mailbox, and postage is paid by the merchant. The merchant decides the ultimate return shipping cost to the customer, such as by deducting that cost from the customer's credit.

Existing merchandise return service methods, such as that offered by the USPS, although convenient for the customer, can be costly and time consuming for the merchant.

It is not enough to provide customers exceptional service in getting packages out the door and into the home. Today, retailers must provide an exceptional returns service. The reward is loyal, better and more profitable customers. The risk of a poor returns experience is alienating an entire generation of direct shoppers who then lose confidence in the brand itself and in the direct purchasing process in general.

For most retailers, returns management is an afterthought. Instead of proactively addressing return-related issues starting with the original order, many retailers wait until the return package has arrived in the warehouse. This creates uncertainty on the part of the customer and inefficient operations inside the warehouse. The average retailer provides a basic level of information about how to return a product on the outbound order summary. In most cases this includes a set of return instructions and an address to which the return package must be mailed. The customer must package the return and find a convenient location to purchase return postage (US Post Office or another shipper). Once the return package is received by the retailer (typically 5-

10 days later), it normally takes an additional 3-4 days for the return to be processed. During this time, the customer has little, if any, insight into what is happening with her return. To insure that the credit has been processed, the customer must wait 2-3 billing cycles to see it appear on her credit card statement or she must contact the retailer's customer service department. Typically, retailers do little to leverage or exploit return reason codes, and seldom do they integrate marketing or loyalty programs within the returns process.

BRIEF DESCRIPTION OF THE DRAWINGS

FIGURE 1 illustrates a merchandise return process using postage due return labels in accordance with the invention.

FIGURE 2 illustrates a return label in accordance with the invention.

FIGURE 3 illustrates an example of bar code fields for the bar code of FIGURE 2.

FIGURE 4 illustrates a method of generating a return label in accordance with the invention.

FIGURE 5 illustrates the use of the return label by the customer.

FIGURE 6 illustrates the use of the return label at the return center for issuing customer credit.

FIGURE 7 illustrates a process of dynamic routing, using data on the return label.

FIGURE 8 illustrates one embodiment of a method of handling returns at a value added returns center, such as the returns center of FIGURE 1.

SUMMARY OF THE INVENTION

One aspect of the invention is that it provides comprehensive returns management, which starts at the original order, includes the customer initiation of the return, processing and transportation through to final disposition, and spans the physical and informational flows throughout the process. The returns program can result in improved customer experience, new revenue opportunities, reduced operating expenses, and reduced return cycle times. The invention provides an integrated returns management system, which drives the process from the initial customer return through the final disposition of the good.

The returns process impacts two main areas of a merchant's return operations: the impact on call center volume and savings from load-balancing inbound returns shipments. Call center savings are impacted through a more convenient returns process, returns tracking and earlier customer notifications (both email and postcard). Reducing return-related calls to call centers will provide substantial savings. Load-balancing savings is realized through reduced transportation expense and reduced processing expenses.

DETAILED DESCRIPTION OF THE INVENTION

This invention described herein is a merchandising method and system that permits a merchant to provide pre-authorized returns, for which the customer need not pay shipping charges. The merchant provides a special return label to the customer, which has machine readable data that enables shipping charges to be assessed at a point of delivery. Data on the return label may further ensure that the package is delivered to an initial point of return close to the customer, thereby providing "reverse zone skipping". The return label may further have data that permits the merchant to dynamically route returned packages and that permits both the merchant and the customer to be quickly notified of the status of the return.

Once a package is received at a returns center, the label is scanned, or otherwise electronically read, and compared to stored data that includes various "rules" associated with each merchant. A processing system is used to link each return package to its associated rules, and to provide various value added services, such as notice to the merchant and/or the customer and dispositioning of the item.

The method is used by, or on behalf of, a "merchant", which is typically a retail merchant. However, the concepts discussed herein may be applied to any merchant, including service providers who sell goods incidentally to the providing of services. The "return" may be for purposes of receiving credit for an item recently purchased, but may also be subsequent to events such as warranty claims, recalls, or for repairs.

The method described herein may be used in connection with a "reverse logistics return service". This type of service is becoming increasingly popular, and permits merchants to "outsource" their returns process. For purposes of this description, these service providers are referred to as "returns providers". They typically provide returns services for a number of different merchants, with part of their services being disposing of packages in accordance with the particular disposition rules of each merchant.

If the merchant uses such a returns provider, the returns label will further have data useful for identifying each merchant and may contain other data particular to that merchant. However, the methods described herein are also useful for returns systems that handle only returns for a single merchant, such as for a merchant having an in-house returns provider.

One example of a returns service that could incorporate use of the return label described herein is the SmartLabel™ service offered by Newgistics, Inc. This service makes use of a bar-coded shipping label, typically attached to an invoice received by the customer when the product is delivered to the customer. To return the product, the customer simply affixes the label to the return package, and drops the package anywhere into the U.S. Postal System (USPS), such as by dropping it into a mailbox. The label directs the package to a returns center maintained by the service provider. The returns provider assesses shipping charges, pays the carrier, and passes the shipping costs on to the merchant, who may then deduct those costs from the customer's credit for the returned item. The various services that the returns

provider provides to the merchant include the return label, aggregation of packages to each merchant, transportation and processing services, payment of shipping charges, reporting, and notifications to the merchant and/or the customer.

For purposes of example herein, it is assumed that the carrier that ships the returned items is the United States Postal Service. However, the same concepts could be applied to a returns process that uses other carriers or multiple carriers, so long as each carrier has the equivalent of postage due capability, that is, the ability to collect shipping charges after the package is delivered, that is, from the returns provider (the package recipient) rather than from the customer.

Overview of Returns with Postage Due Shipping

FIGURE 1 illustrates a returns process that uses postage due return labels in accordance with the invention. In the embodiment of FIGURE 1, returns are processed through a returns provider that handles returns for multiple merchants. However, as stated above, the method described herein may be easily adapted for a returns provider that handles only returns for a single merchant. In either case, the merchant is considered to "maintain" at least one returns center, whether by directly maintaining the returns center(s) or by associating with a third party that does so.

In Step 110, a merchant has delivered an item to a customer. In Step 111, the customer has decided to return the item, herein referred to as "the return item".

A returns label 20 has already been, or is to be, provided to the customer. In the example of FIGURE 1,

the return label 20 is delivered as an enclosure with the customer's original order, such as by being part of the customer invoice or a separate insert.

In other embodiments, return label 20 could be downloaded from a data network and printed by the customer, or otherwise delivered to the customer by means other than being included with the merchandise delivery. For example, the return label 20 could be separately mailed or send as by facsimile. As another example, the customer might access a website provided by the merchant, link to a returns page, and download the data for printing the return label.

Return label 20 is "pre-authorized" in the sense that the customer need not seek authorization from the merchant. The customer is apprised by the merchant that returns are pre-authorized, such as by information on the invoice or other shipping documents. The notification may be explicit on the return label or elsewhere or may be implicit. The customer is further apprised that the customer need not pay shipping charges, such as by a "no postage necessary" printing on the return label 20.

An example of a suitable return label 20 is described below in connection with FIGUREs 2 and 3.

The customer affixes the returns label 20 to the packaging for the return item, and hands over the return item to a carrier, without paying any shipping charges to the carrier. The customer need not affix any indicia of postage or other shipping costs to the packaging. In the example of this description, the customer may simply deposit the package into the US postal system, by putting it into a mailbox (if postal compliant), dropping it off at a postal drop, or taking it to a post office. The

return is local to the customer in the sense that the customer may select whatever drop-off point is most convenient.

As further explained below in connection with FIGURE 2, return label 20 is preprinted to indicate at least the destination for the item and the package origin (the point where the customer places the package with a carrier). Typically, the destination and origin are identified by addresses, including postal codes. For purposes of this description, "postal codes" include the ZIP (zone improvement plan) codes of the USPS and similar codes used in other countries.

The returns label further indicates that delivery charges are to be paid by a recipient. It further identifies the transaction leading to the return. Typically, this is a purchase transaction and the identification is by invoice number or other indicia of the package or its contents. In other embodiments, the transaction could be a warranty claim or repair request.

In Step 112, the carrier delivers the return item to the returns provider. As stated above, in the embodiment of FIGURE 1, the initial point of return for the package is a specialized returns center, which may receive returns for more than one merchant. The returns center may be regional for a large area such as the United States. In other words, a large geographic area may have a number of returns centers.

For a returns provider having regional returns centers, the return label 20 may ensure "reverse zone skipping". At the time the data for each returns label 20 is composed, the destination address on the label 20 is determined.

The destination address is typically that of a carrier station (such as a postal center) nearest the customer. This may mean that return packages are carried from the customer drop-off location to a destination associated with the carrier for pickup by the returns provider. For example, where the carrier is the USPS, the package could be delivered to one of 21 regional bulk mail centers (BMCs). The package is delivered to the BMC closest to the location of the returns provider. The returns provider may then pick up accumulated packages addressed to it. Equivalently, the carrier then may deliver the package directly to the returns center. In either case, the destination address is considered to be "to" a returns center closest to the customer.

In Step 114, the returns provider receives the package from the carrier. The returns provider scans the return label on the package and weighs the package. Any special shipping flags or indicia are entered at this time. In this manner, the returns provider receives multiple packages, which may be items originating from multiple merchants, throughout a daily course of business.

In a process known as "manifesting", the returns provider calculates the shipping charges due to the carrier and electronically manifests the carrier. Typically, this is done on a daily basis. In the example of this description, the returns provider pays the carrier, and is compensated by the merchant for carrier costs and other services.

The returns provider then sorts the packages by merchant, again using data printed on return label 20, and collects the packages associated with each merchant.

The final destination code is encoded on the return
label, and may also be printed in human readable form.
For large volume merchants, the destination code may be
associated with a package chute and/or a docking door.

The returns provider may also provide "value added"
services for the benefit of the merchant, such as
notification of the return to merchant or notification to
the customer of receipt of the package. For example, the
returns provider may use the scanned return label
information to notify the customer and/or the merchant
that the package has been received.

In Step 116, after aggregating the packages for each
merchant, the returns provider further ships them in
accordance with whatever policies are specified for that
merchant. For example, the returns provider may
palletize shipments back to the merchant. The return
label data is used to create a bill of lading, with data
such as pallet counts, package counts, and shipment
weight.

In Step 118, the package is handled according to the
disposition policy of the merchant, such as by being
returned to stock, sent to a re-seller, liquidator, or
otherwise disposed.

A processing center 119 is used to collect data
scanned from return labels, and to process the returns.
The processing center 119 includes computer processing
equipment, including computers, data storage, and
networking equipment, appropriate for communication of
data to and from returns centers, merchants, and
customer, as appropriate.

The computing equipment is programmed to fulfill the
various data processing services described herein. For

example, processing center 119 may provide a web page or
other network-accessible data source, accessible by
customers for obtaining information about returns and
data for printing return labels. It also stores business
rules from merchants, which are typically delivered to it
by electronic transmission over a data communications
network. As explained below, the processing center 119
match data on the return label to these merchant rules,
which may specify disposition of the package or other
rules for handling the return.

Returns Label Provided to the Customer

FIGURE 2 illustrates an example of a return label
20, suitable for use with the merchandise return method
of FIGURE 1. In the example of FIGURE 2, the carrier is
the USPS. Return label 20 incorporates data appropriate
for the merchandise return service offered by the USPS,
as well as data used for additional services provided by
the returns provider. As stated above, other or
additional carriers having the equivalent of postage due
capabilities could be used, in which case, return label
20 would be modified to comply with the requirements of
those carriers.

The customer's address 21 is printed on the upper
left corner of label 20. This address matches the
original delivery address.

The visual flag 22 is a human readable code, that
can be used for various purposes. In the example of this
description, flag 22 is a destination code that indicates
a final package destination. Examples of final
destinations are a merchant's warehouse, a liquidator, or
a warranty, recall or repair center. This destination

code may match a destination code embedded in barcode 25. In other embodiments, flag 22 could correlate to any sort of business "rule" of a merchant. As another example, visual flag 22 could indicate a quality of service, such as whether the package is to expedited or held for some reason. Or flag 22, could indicate the contents of the package, such as whether it is "high value" for special handling.

In general, flag 22 permits the package to be manually sorted at the returns center for subsequent routing. The examples set out above for its use are merchant-specific, in the sense that the flag is specific to a particular merchant and its returns processing rules. The flag, being human readable, can be easily correlated to rules displayed on a display in communication with processing system 119. These displays can be conveniently located at stations at the returns center and the displayed information used for sorting and other handling decisions.

The merchandise return rectangle 23 is specific to the carrier and pertains to the relationship between the carrier and the returns provider. In the example of this description, it states the USPS permit information of the returns provider.

The delivery address 24 is, as explained above, the address of a delivery location that is geographically nearest the customer. This determination of this address is dependent on the customer's postal code, as specified during the transaction leading to the return (such as the purchase transaction). As stated above, the delivery address could be a carrier center, such as a USPS bulk

mail center, where it is held for pickup by the returns provider.

Barcode 25 is a dynamically generated machine-readable code that is based on unique information about the specific transaction involving the item(s) being returned. An example of barcode data is described below, but in general, the barcode data provides data for information servers 119 so that various "value added" returns processing tasks may be performed, such as manifesting of shipping charges, notifications to the customer and/or merchant, and final disposition of the returned item.

The barcode data permits the returns center to correlate the returned item back to the transaction with the customer. One type of correlation is an invoice number, as indicated by the example below.

Barcode 25 may comprise various alphanumeric or numeric only formats. Various other types of machine readable coding could be used as an alternative to bar-coding, such as other types of optical scan data or radio frequency identification (RFID) tagging. The coding may be printed or may be some other format, such as the electronic circuitry used in an RFID tag.

The "postage due" insignia 26, including the horizontal bars 26a, indicates to the customer and the carrier that shipping charges are to be paid by the recipient.

Barcode 25 is a "third party barcode" in the sense that need not be specified by the carrier, which in this case, is the USPS. Although not shown in FIGURE 2, return label 20 may have one or more additional barcodes,

for example a barcode containing data for the carrier's use, such as for carrier tracking or return confirmation.

FIGURE 3 illustrates a data string that is an example of the contents of the barcode 25 of FIGURE 2. The example of FIGURE 3 has 24 positions, each with an alphanumeric character. The information in barcode 25 is "integrated" in the sense that it is contained in a single barcode or other machine readable string of data.

The barcode 25 contains multiple data points, and contains data that is "transaction specific", in the sense that it identifies the transaction between the customer and the merchant or other party to whom the package is being delivered. The "transaction specific" data is dynamically generated in the sense that it is generated after the original order is made, and is specific to that transaction.

In general, the barcode data points are used to process the package for purposes other than moving it from one place to another. In contrast, "carrier specific" data elsewhere on the label 20 functions merely for shipping purposes.

Field 1 identifies the returns provider. Field 2 identifies the package destination.

Field 3 represents the shipping origin of the package (customer's postal code), which permits assessment of shipping charges from where the customer drops off the package (the return package origin) to the returns center (or a nearby BMC) where it is pulled from the carrier.

Field 4 identifies the merchant from whom the item was purchased. Or, as explained above, some party other than the merchant may be involved in the transaction

leading to the return, such as a warranty or repair service.

Field 5, a selector field, may be used for various purposes, such as to identify the label type, or to identify a shipping category, such as Priority Mail or customer-paid.

Field 6 identifies the transaction involving the returned item in some manner. This is typically the purchase transaction, such as in the case of a customer returning recently purchased goods. This terminology is used herein for sake of consistency. This field is used to correlate the return label to the original order, such as by filling the field with the invoice number. This field could also be used for data such as a customer number, product number (such as an SKU), or other data.

As explained below, data on barcode 25 may be used to correlated the package (or the item inside) to merchant business rules. This involves identifying the merchant or the specific purchase transaction. Any date that permits such identification, whether explicitly or inferentially, may be sufficient for correlation of business rules.

If desired, one or more of the above-described fields could be omitted and another field used to link to the same information at the returns center. For example, Field 3 (the customer's postal code) could be omitted and Field 6 used at the returns center to dynamically link to stored data that provides the customer's postal code. In this event, barcode 25 would equivalently be considered to contain "data representing at least the origin of the package and identification of the transaction".

It should be understood that the barcode data in the example of FIGURE 3 is minimal and additional data could be easily included. Additional data points that may be included in the barcode 25 include data points falling into categories "transaction specific", "merchant specific", "customer specific", "product specific", "trading partner", or "disposition" data. "Transaction specific" data identifies the transaction, such as by invoice number in the case of a purchase transaction. The "merchant specific" data identifies the merchant or some characteristic of the merchant. The "customer specific" identifies the customer or some characteristic of the customer. "Product specific" data identifies the package contents, such as by SKU number. "Trading partner" data describes a trading partner of the returns center, such as a liquidator or other service provider. "Disposition" data describes a disposition rule or final destination of the returned item.

Often, the merchant directly provides the return label (or data for generating the return label) to the customer. To this end, the returns provider provides the label specifications to the merchant, as well as a delivery address data file. This data file is used to correlate each customer's postal code to the returns provider location that is closest to the customer. The data file is made available to the merchant via data network access, such as by the internet.

In the example of FIGUREs 2 and 3, the data on the returns label 20 is pre-printed. In other embodiments, the customer might fill in at least some of this data. For example, label 20 could have a predetermined format, and the customer would be directed to fill in certain

information such as the customer's address, the package invoice number, or a shipping destination. However, in general, regardless whether label 20 is entirely pre-printed or all or partly filled by the customer, it is deemed to have a predetermined format, and prior to being shipped by the customer, to contain certain customer data as discussed in connection with FIGUREs 2 and 3.

The various data elements described above in connection with FIGUREs 2 and 3 can be used to implement the various returns services described herein, and some of these concepts may be implemented independently of others. For example, by using data representing the origin of the package (such as the customer's postal code), the returns center can perform reverse manifesting. By using data representing the original shipment (such as the identity of the merchant, the invoice, or the item), the returns center can dynamically route the package or notify the merchant or the customer about the status of the return.

Use of the Returns Label

FIGURE 4 illustrates a process of generating a return label, such as return label 20. In the example of FIGURE 4, the return label 20 is to be provided to the customer in the original shipment. In Step 41, the merchant enters the order information to an automated order processing system. In Step 42, the merchant determines whether the order is an exception item. In Step 43, the merchant receives BMC (bulk mail center) data, which as explained above, is used to determine the BMC closest to the customer. In other embodiments, where the carrier is not the USPS, the address of some other

carrier station close to the customer is used. In Steps 44 and 45, the return label and invoice are printed. In Steps 46 and 47, the order is fulfilled and shipped to the customer, with the return label being enclosed with the order.

FIGURE 5 illustrates the use of the return label 20 by the customer. Steps 501 - 510 illustrates various alternative ways for the customer to obtain the label 20. In Step 501, the customer receives the label 20 with the invoice in the original shipment, as described above in connection with FIGURE 4. The customer may merely detach the label (Step 509).

In Step 502, the customer receives the label 20 by contacting customer service of the merchant, such as by phone call or email (Step 504). The label is then generated (Step 506) and emailed to the customer (Step 508).

In Steps 503 and 505, the customer receives the label by accessing a website and requesting an image. The label is generated and displayed (Steps 506 and 507) and the customer prints the label (Step 510).

In Step 520, the customer prepares the return by filling out a return form and applying the return label to the package. In Steps 521 and 522, the customer packages the return and drops it with the carrier specified by the merchant.

Steps 530 - 536 illustrate how data from the return label can be used to facilitate tracking requests. In Step 530, the package has been received at the returns center and scanned as described above in connection with FIGURE 1. The data is stored and accessible by a

tracking process, which may be part of processing system 119.

In Step 531, the customer makes a tracking request through customer service of the merchant. In Step 533, the request is processed, and the results communicated to the customer. In Step 532, the customer makes a tracking request via the merchant's website. In Steps 533 and 534, the request is processed and the results are displayed.

FIGURE 6 illustrates an example of the use of return label 20 for issuing credit to the customer. FIGURE 6 is an expansion of one aspect of the returns center processing in Step 114 of FIGURE 1.

In Step 61, the package with the return label affixed is received at the returns center. It is assumed that return label 20 has at least some means to correlate the package to the original order, such as an invoice number. In Step 62, the label is scanned and linked to the original order. In Step 63, the reason for the return is captured, such as by reading the return form. The reason for the return may be used to determine whether the customer is to bear shipping costs for the return, and hence the amount of credit to the customer. The return reason may be communicated to the merchant, in addition to other return information, using processing system 119. In Step 64, the credit due the customer is calculated. Step 64 may involve accessing stored business rules of the merchant. In Step 65, data for implementing credit to the customer is delivered to the appropriate processing center.

Value Added Returns Centers

FIGURE 7 illustrates how the data on returns label 20 can be used to implement "dynamic routing". In Step 71, the package is received at a returns center. In Step 72, at the returns center, using processing system 119, data on barcode 25 is linked to the merchant's specifications for routing the package to its final destination. In Step 73, the package is routed in accordance with whatever specifications are current at that time. For example, the original shipment data may indicate that a package contains a seasonal item. At the end of the season, these packages may then be routed to an outlet destination rather than a re-stock destination. As another example, for a returns center that handles packages for more than one merchant, the original shipment information might merely identify the merchant. The returns center can then match the packages of that merchant to the current rules for that merchant, such as by routing all packages to a particular destination.

FIGURE 8 is an expanded illustration of the services provided at a returns center, Step 114 of FIGURE 1. Both the path of packages as they physically move through the return center and the data path of data pertaining the packages are shown. The movement of packages through the return center can be by conveyor belt or any other convenient means. The data path may be achieved by conventional computer networking software and equipment, implemented with processing system 119.

At the returns center many different services can be provided for the benefit of the merchant, so that the merchant's costs from customer returns are minimized and customer satisfaction enhanced. As explained below,

these services include notification of the return to the merchant and/or the customer, item level sorting, and item disposition. These services are "rules-based", which means that the merchant provides rules that are stored in processing system 119, which uses machine readable return information from the package to associate the item with the appropriate rule(s). Processing system 119 is used to store the machine readable data so that it may be displayed at any one or more of the various returns processing stations described below.

In actual implementation, the returns system is best implemented with a number of returns centers, distributed throughout a geographic region such as the United States. Among other advantages, the use of distributed returns centers decreases shipping costs by permitting "reverse zone skipping". This means that packages are initially delivered to a returns center closest to the customer. From the returns center, packages to common destinations are aggregated and shipped to its final destination. The result is a shipping process that is more expeditious than if each package were required to be shipped all the way from the customer to its final destination.

Steps 401 - 404 are performed at a scan station by a scan station operator. In Step 401, the incoming package is placed on a receiving line. In Step 402, the machine readable code on the package label is scanned. In Step 403, the package is weighed and the weight recorded. In Step 404, the operator places a label on the package indicating how the package is to be aggregated with other packages, such as by merchant, quality of service, or disposition. This label is for internal use at the returns center and can be machine readable, human

readable, or both. In Step 405, the data collected at the scan station is transferred to processing system 119, which creates and stores a data file for the package.

Step 406 is performed at a sorting station, where a sorter identifies the package destination and places the package in a container for packages similarly aggregated. Depending on the returns rules for the merchant, items can be categorized by product category or disposition.

Step 407 is a manifesting step, performed by processing system 119, which occurs independently of the remainder of the physical path of the packages. In Step 407, the package data files are used to generate a manifesting report representing shipping charges for all packages received in a batch. Typically, manifesting is performed on a daily basis. The manifest report is delivered to the carrier, which audits the manifest and collects shipping charges.

Steps 408 and 409 are also performed by processing system 119, and entail communicating various data to and from the merchant associated with the returned package.

Step 408 involves receiving and storing merchant business rules, which permit the merchant to specify how packages are to be handled. As explained herein, these rules permit packages to be handled according to any categorization desired by the merchant. For example, the merchant may specify "all shoes go to charity" or "all men's shoes go to charity and all women's shoes go to an outlet". Returns rule may govern any phase of the returns processing and may be as complex as desired by the merchant. For example, returns rules for notifications may be as simple as a single rule for all returns that specifies "notify merchant".

Step 409 involves accessing the merchant order associated with the returned package. This step may be used to correlate data from return label 20 (especially scanned data from barcode 25) to additional data about the returned item(s).

Step 410 involves communicating return information to the merchant and/or the customer. For example, as explained below, data collected at an opening station may be used to apply a credit to the customer's account with the merchant. The type of information delivered about the return and to whom it is delivered, and when and how delivered, may all be specified in the merchant's business rules.

The data may also be used to send return notification and other return information to the merchant. The data may further be used to notify the customer of receipt of the package, and perhaps also application of credit to the customer's account. As a result of notification, the merchant or the customer (or both) are made aware of the status of the return while it is still in transit.

In other embodiments, notification to the merchant and/or consumer could occur at different stages of the process of FIGURE 8. Essentially, the notification(s) may occur anytime after the package has been scanned in Step 402. In general, implementing notification at a point early in the process achieves the goal of promptness, whereas later in the process, more information about the package and the return (such as after the package is opened) can be delivered. If desired, early notification can be complemented with a tracking system that permits the merchant and/or customer

to obtain additional data about the return. The
notification process can include separate "return
confirmation" notices and "credit notification" or these
notifications may be combined.

If desired, merchant and/or customer visibility into
the returns process can be achieved at various
"touchpoints". For customers, these touchpoints include
access to the status of the return via call centers,
email communications, postcard delivery, and websites.
Data about the return can be made available by the
returns center to any of these systems. Customer
satisfaction is greatly enhanced because the customer
knows that his or her return is being handled -- that the
package has been received, that a credit or exchange is
in progress, and whether that the shipping fee is being
debited.

Notification can be complemented with self-service
tracking, such as by website or call center. The
customer is then able to either passively receive
notification or actively inquire about returns status.
In some embodiments, returns data may be transmitted
electronically from the returns center to a merchant-
maintained data center. This permits customer
notifications and tracking to be achieved directly under
the merchant "branding", such as through the merchant's
website or call center.

The various options for notifying the customer
and/or merchant, the contents of the notice, and the
transmittal of tracking data to a tracking system, are
all determined by merchant notification rules. These
rules may be stored in processing system 119 and accessed
in Step 413.

Steps 411 - 415 are performed at a package opening station, and involve "item level" handling. Step 411 is opening the package. Step 412 viewing the order on a display screen, the order having been correlated to the package identifier (already scanned in Step 402 or rescanned in Step 412a) and accessed using processing system 119 in Step 408. Step 414 is identifying the return item in the package.

Step 415 is signaling to processing system 119 that a credit is due the customer. Step 410 is handling the credit, if called for by merchant rules, and in the manner called for by the rules.

If desired, an additional step performed at the opening station could be scanning the item itself, for an SKU number or other item information to be added to the data file for the returned item. Opening and identifying returns is made more efficient with the use of scannable barcodes and touch-screens, eliminating the inefficiencies and inaccuracies found in hand-keying.

Steps 420 - 422 are performed at a dispositioning station. Step 420 is examining the item. Step 421 is determining the disposition of the item. Step 421 is performed in accordance with disposition rules provided by the merchant and stored in processing system 119 in Step 409. Items may be dispositioned by factors such as SKU, value, age, or zip. Step 422 is sorting the item according to its disposition. The various dispositions may include return-to-stock (RTS), return to vendor (RTV), liquidate, send to outlet, destroy, or recycle. Various "return to fulfillment" options may be provided in addition to return to vendor.

Steps 430 - 432 are performed at a staging station. In Step 430, package containers are placed in outbound lanes. In Step 431, the returns provider generates bills of lading. In Step 432, the returns provider notifies the carrier that the container is ready for pickup.

The process described above provides for processing of returns at the item level. That is, the package is opened, sorted, and dispositioned out of the package in which it was returned. Items may be poly-bagged or otherwise re-packaged and labeled according to return rules specified by the merchant and stored in processing system 119. A simpler implementation of the process would eliminate the package opening and examination and sorting at the item level, and packages would be handled, re-labeled, and aggregated at the package level.

Regardless whether the returns center handles returns at the package level or item level, the returns center is capable of multi-level sorts. As indicated above in connection with FIGURE 8, the final sort is typically on the basis of the package's (or item's) final disposition. However, prior to that, sorting can be determined from flag 22 or barcode 25, at any level desired by the merchant. For example, at a product category level, all shoes may be routed to a specialist for examining.

In the example of FIGUREs 1 and 8, the services incorporate use of a postage paid return label, such as label 20, which has machine readable coding. However, the methods of FIGURE 4 could be easily adapted to postage paid packages, such as by eliminating the manifesting steps.

Rules-Based Returns Processing

In all embodiments of the invention, an important feature is the use of merchant business rules. These rules can specify any aspect of returns handling -- sorting, notification, examination, disposition, crediting. The merchant can update or condition the rules as desired. The rules permit the return process to be dynamic, in the sense that they can be changed independently of any tags, codes, or other indicia printed or attached to the package or item being returned. They can be changed after a return label has been printed, which means that they can be changed after an item has been sold and while it is in transit. Barcode 25 and any other indicia with the returned item are used to correlate to the merchant's current set of rules. For example, if shoes are returned when they are out of season, a new business rule can specify that they are to be liquidated rather than returned to stock.

The following table provides a detailed description of the various tasks that may be performed at a returns center, such as the returns center of FIGURE 1. Returns with various types of labels, whether in accordance with label 20 or having less or no machine readable data, may be received at the returns center. The level of returns processing (the type and number of the tasks that are performed) is determined by the type of label and the merchant's returns rules. Inbound packages to the returns center can be sorted for value-added services or passed through to dispositioning without additional services.

Value Added Center, System Setup	
Requirement Name	**Description**
Support for all return types	System must be able to process packages and items from any inbound source, including: • Neighborhood return stores • Packaged mailing label • Web-based mailing label • Self-paid Label (e.g., not pre-paid and without bar-code)
Value-added or delivery-only	• System must support setup of merchant selection for value-added (full-service) or delivery-only handling
Rules-based inbound package sort	System must support setup of inbound package routing rules. • Package rules must support merchant selection • Package rules must support size-based conditions. Package rules must support weight-based conditions
Rules-based Routing / Disposition	System must support setup of merchant item routing/disposition rules. • Item rules must support value-based conditions. • Item rules must support size-based conditions. • Item rules must support weight-based conditions. • Item rules must support SKU-based conditions. • Item rules must support specification of an item label
Rules-based Inventory Hold/Delivery thresholds	System must support setup of Merchant rules controlling Inventory Hold/Delivery thresholds. • Rules must support volume (trailer load) options. • Rules must support time-limit options. • Rules must support disposition types • Rules must support item category types Rules must support vendor types
Multiple Merchant / RTS locations	System must support setup of merchant locations, including multiple Return-to-Stock (RTS) locations Locations are driven by SKUs.
3rd party locations	System must support setup of other delivery locations, including outlets, donation centers, liquidation tent-sale sites.
Rules-based RTV processing	System must support setup of Vendor return processing rules • ability to notify Vendor based on time-based thresholds • ability to notify Vendor based on volume-based thresholds • ability to notify Vendor based on SKU-based thresholds support for electronic notification methods, including email and fax.
Merchant Product ID Setup	System must be able to setup merchant product Ids, by receiving product identifier data from merchant.
Multi-carrier support (inbound)	Ability to support multiple inbound transportation carriers.
Multi-carrier support (outbound)	Ability to support multiple outbound transportation carriers.
Number of VACs	

Value-added Center: Receive	
Requirement Name	**Description**
Scan	• Label must be scanned • Merchant label, if bar coded, must be scanned. • Must support scans of multiple merchant bar codes on a single label, in order to uniquely identify order. • If label is not scanned, package must be identified and recorded in some other manner. • Scan must record receipt of package, with date recorded as GMT. • Scan must record destination of package, if applicable. • Scan must record full bar code information, up to 64 bits. • Scan must record inbound carrier source. • Scan must record package tracking number, if applicable. • Scan station must support data entry.

Damage check	• Must examine package for damage.
	  o Criteria should be broad: either "package OK" or "package destroyed"
	  o Default is "package OK"
	• Results of inspection must be recorded.
	• Setup must be configurable by facility.

Weigh	• Each package, regardless of destination, must be weighed. • Package weight must be recorded in the system. • Weight shall be recorded in pounds in four decimal places, accurate to two decimal places.
Inbound Package Sort	• Packages must be sorted according to destination (merchant, warehouse/location). • Damaged packages must be separated and processed separately. • Must permit routing of "pass through" packages without value-added processing, or "value added" packages.
License Plate support	• Ability to assign a unique ID to inbound pre-paid packages without a label, including a merchant ID and facility ID.
Multiple barcode support	• Ability to record multiple barcodes on inbound package.

Value-added Center: Identify	
Requirement Name	**Description**
Opening	• Open all packages routed for value-added processing
Documentation	• Extract documentation from package. •
Item Identification	• Match items to documentation or RMA, if applicable. • Verify that items can be properly identified • Verify that the items match the documentation (paper) • Verify that the items match the documentation (electronic) • Record item identification • Record item return reason • Record item return type (return, exchange or gift) • Record item inspection data, if any • Record item quantity
Notification to Merchant	• Provide return data to merchant enabling credit notification • Provide item disposition data to merchant • Provide package receipt and tracking notification to merchant • Support for multi-invoice returns • Support for multi-package return • Frequency of notification to merchant
Disposition & Destination Sort: RTM only (Rules-based)	• Support for the following Disposition types: o RTM (return-to-merchant) • Route item according to Merchant business rules • Record routing of each item • Follow Merchant rules for disposition and destination. • Support for multiple sorts

Disposition & Destination Sort: various (Rules-based)	• Support for the following Disposition types:
	  o RTS (return-to-stock)
	  o RTV (return-to-vendor)
	  o Outlet
	  o Destroy
	  o Liquidate
	• Route item according to Merchant business rules
	• Record routing of each item
	• Follow Merchant rules for disposition and destination.
	• Support for multiple sorts

Disposition & Destination Sort: various (Exam-based)	• Route item according to Merchant exam
	• RTS (return-to-stock)
	  o RTV (return-to-vendor)
	  o Outlet
	  o Destroy
	  o Liquidate
	• Record routing of each item
	• Follow Merchant rules for disposition and destination.
	• Support for multiple sorts

Vendor Return Authorization	• Support for vendor return authorization processes
Package & Dunnage Removal	• Support for removing package and dunnage materials
Item labeling	• Support production of item labels, based on internal rules
Inventory Aggregation & Hold	• Collect and store items destined for a common location /destination. • Support at both facility and system levels.
Non-deliverables support	• Ability to process non-deliverable packages.
Poly-bagging support	• Ability to support poly-bags for certain disposition types
Disposition & Destination Data Notification	• Record and transmit data to neighborhood return center
Disposition Management	• RTS: support for delabeling items •

Value-added Center: Shipping	
Requirement Name	**Description**
Container Aggregation	• Containerize packages or items for a common destination
Package identification	• Identify the individual packages in a container
Container manifest	• Generate a manifest for each container • Record the container manifest in the system • Identify containers destined for a common destination
Trailer/truck manifest	• Generate a manifest for the trailer/truck • Record the trailer/truck manifest in the system • Record Bill-of-lading (BOL) in the system

Exception Handling / Research	• Ability to access merchant customer history, including off-file data.
	• Ability to create new customers in Merchant system
	• Support for data entry
	• Ability to identify multiple product attributes
	• Support for customer change-of-address
	• Support for the following scenarios:
	  o Cannot identify merchant
	  o Cannot produce an RMA
	  o Cannot identify item
	  o Cannot identify order

Re-box, re-kit, re-furbish	• Re-package according to merchant fulfillment rules
Item labeling (per Merchant WMS)	• Produce and apply item labels according to merchant rules, with no merchant integration
Item labeling (per Merchant WMS)	• Produce and apply item labels according to merchant rules, with merchant integration

Forward Fulfillment	• Provide forward fulfillment capabilities, including:
	  o integration with merchant order management system
	  o re-packaging, re-labeling as needed
	  o record and transmit data to processing center.

Aging	• Support for merchant driven inventory-aging rules.
Proof of destruction	• Support for merchant and/or vendor approved proof of destruction services.
Liquidation service	• Support for value-added liquidation services.
Vendor inspection	• Support for vendor inspection.

Value-added Center: Carrier	
Requirement Name	**Description**
Final Ship Notification	• Record and transmit the following: o Delivery confirmation
Notification tracking	• Ability to tracking notification information via a web site

Value-added Center: Data Communications	
Requirement Name	**Description**
Neighborhood return center Integration	• Transmit recorded data to processing center • Frequency of data transmission is daily (end-of-day) at minimum

Package-level details	• Record and transmit the following data for each package
	  o Date and time received (GMT)
	  o Date and time shipped (GMT)
	  o Merchant
	  o Package identifier
	  o Package carrier source (e.g., FedEx, USPS)
	  o Package weight
	  o Package destination
	  o Package bar code
	  o Package condition
	  o Package routing, if applicable (e.g., facility to facility)
	  o Type of service, including "value-add" or "pass-through"

Item-level details	• Record and transmit the following data for each item:
	  o Date and time scanned
	  o Item identifier
	  o Order line number/identifier
	  o Item matches documentation flag
	  o Disposition
	  o Destination
	  o Return reason
	  o Return type
	  o Sort or slot, if applicable
	  o Pallet ID, if applicable
	  o Container ID, if applicable

Outbound Manifests Bills of Lading/Manifests	• Provide bills of lading for each pallet/container • Provide bills of lading for each truck/trailer load • Bill of lading must identify packages, for "pass-through" customers • Bill of lading must identify items, for "value add" customers • Each bill of lading shall be transmitted to processing center • Transmission shall take place no more than 24 hours after shipment
Vendor RA Notification	• Support for electronic notification, including smtp, ftp, fax and/or Interactive Voice Response (IVR) system. • Configurable by vendor and / or merchant.

Final Ship Notification	• Record and transmit the following:
	  o Pickup notification
	  o Pickup confirmation

Billing Support	Record and transmit all data required to bill partners and merchants.
Carrier Manifest Support	o Support for reporting and sampling necessary to fulfill Manifest requirements.

Priority Mail Support	
Requirement Name	**Description**
Capture in PacSys if a package was sent Priority Mail	During the scanning and weighing process, must capture if a package was sent by a consumer using the USPS Priority Mail service. This capability is configurable by merchant, and optional depending on merchant rules (similar to a balloon flag)
Pass Priority Mail notification to ReturnValet	For each Priority Mail package scanned at the warehouse facility, the system must pass the appropriate notification to ReturnValet. Must be included in both the 221 CSV transmission and the nightly FTP file
Capture if a package was sent using Priority Mail	The system must accept notification from the carrier if a package was sent using Priority Mail.
Configure the electronic manifest to act upon the Priority Mail notification	The electronic manifest must be able to include or remove Priority Mail packages from the postal billing calculation.
Rate Priority Mail packages within the manifesting process	The system must use the Priority Mail notification to correctly assess postage for all Priority Mail packages.
Remove Priority Mail packages from electronic manifest document	The system must remove all packages identified as being sent Priority Mail before the electronic manifest is created.